WHAT IS CLAIMED IS:

1. An abnormality detection method on a server, by which the server for providing an electronic mail transmission service via a network to a computer making a request for transmitting an electronic mail detects an operational abnormality of the computer, the method comprising:

a step of accepting the electronic mail transmission request from the computer;

a step of transmitting the electronic mail of which the transmission request has been accepted;

a step of accumulating transmission history information about the transmitted electronic mail;

a step of referring to request history information about a transmission request history of the electronic mail that is accumulated on the computer;

a step of comparing the transmission history information with the request history information; and

a step of detecting the operational abnormality of the computer on the basis of a result of the comparison.

2. An abnormality detection method on a server according to Claim 1, further comprising:

a step of referring to a transmission

confirming condition on the computer when transmitting the electronic mail;

a step of confirming the transmission history information containing the latest transmitted
5 electronic mail in accordance with the transmission confirming condition; and

a step of referring to, in case the result of the confirmation in the confirming step meets a predetermined standard, the request history
10 information and comparing the request history information with the transmission history information.

3. An abnormality detection method on a server, by which the server for providing an electronic mail
15 transmission service via a network to a computer making a request for transmitting an electronic mail detects an operational abnormality of the computer, the method comprising:

a step of accepting the electronic mail
20 transmission request from the computer;

a step of transmitting the electronic mail of which the transmission request has been accepted;

a step of accumulating transmission history information about the transmitted electronic mail;
25 a step of referring to a transmission confirming condition on the computer when transmitting the electronic mail;

a step of confirming the transmission history information containing the latest transmitted electronic mail in accordance with the transmission confirming condition; and

5   a step of detecting the operational abnormality of the computer on the basis of a result of the confirmation.

4. An abnormality detection method on a server
10   according to Claim 1 or 3, further comprising a step of informing the computer that the operational abnormality of the computer has been detected.

5. An abnormality detection method on a server
15   according to any one of Claims 1-3, further comprising:

a step of referring to the operation history information of mail software for making a request for transmitting the mail on the computer;

20   a step of comparing the operation history information with the transmission history information; and

a step of detecting the operational abnormality of the computer when a content of the transmission
25   history information is in a predetermined relationship with a content of the operation history information.

6. An abnormality detection method on a server according to any one of Claims 1-3, wherein the server is a relay device for relaying the electronic

5   mail to a transmitting destination.

7. An abnormality detection method on a server, by which the server for providing an electronic mail transmission service via a network to a computer

10   making a request for transmitting an electronic mail detects an operational abnormality of the computer, the method comprising:
        a step of accepting the electronic mail transmission request from the computer;

15   a step of transmitting the electronic mail of which the transmission request has been accepted;
        a step of accumulating transmission history information about the transmitted electronic mail;
        a step of making the computer refer to the

20   transmission history information; and
        a step of making the computer confirm the operational abnormality of the computer on the basis of the transmission history information.

25   8. An abnormality detection method on a server according to Claim 7, further comprising:
        a step of referring to a transmission

confirming condition on the computer when

transmitting the electronic mail;

a step of confirming the transmission history

information containing the latest transmitted

5 electronic mail in accordance with the transmission

confirming condition; and

a step of making the computer refer to, in case

the result of the confirmation in the confirming

step meets a predetermined standard, the transmission

10 history information.

9. An abnormality detection method of detecting

an operational abnormality of a computer, executed by

an electronic mail system comprising the computer for

15 making a request for transmitting an electronic mail

and a server for transmitting the electronic mail in

response to the request from the computer, the method

comprising:

a step of referring to request history

20 information related to a transmission request history

of the electronic mail by the computer;

a step of referring to transmission history

information of the electronic mail by the server;

a step of comparing the request history

25 information with the transmission history

information; and

a step of detecting the operational abnormality

of the computer on the basis of a result of the comparison.

10. An abnormality detection method on a computer, by which the computer requesting a server for providing an electronic mail transmission service to transmit an electronic mail via a network detects an operational abnormality of the computer, the method comprising:

a step of requesting the server to transmit the electronic mail;

a step of accumulating request history information about the electronic mail of which the transmission has been requested;

a step of referring to transmission history information related to a transmission history of the electronic mail accumulated on the server;

a step of comparing the request history information with the transmission history information; and

a step of detecting the operational abnormality on the basis of a result of the comparison.

11. An abnormality detection method on a computer according to Claim 10, further comprising:

a step of referring to a transmission confirming condition on the computer when

transmitting the electronic mail;

a step of confirming the request history information containing the latest transmitted electronic mail in accordance with the transmission

5 confirming condition; and

a step of referring to, in case a result of the confirmation in the confirming step meets a predetermined standard, the transmission history information and comparing the transmission history

10 information with the request history information.

12. An abnormality detection method on a computer according to Claim 10 or 11, further comprising:

15 a step of referring to the operation history information of mail software for making a request for transmitting the mail on the computer;

a step of comparing the operation history information with the transmission history

20 information; and

a step of detecting the operational abnormality of the computer when a content of the transmission history information is in a predetermined relationship with a content of the operation history

25 information.

13. An abnormality detection method on a

computer, by which the computer requesting a server for providing an electronic mail transmission service to transmit an electronic mail via a network detects an operational abnormality of the computer, the

5   method comprising:

a step of transmitting the electronic mail;

a step of accumulating history information about the transmitted electronic mail;

a step of referring to a transmission

10   confirming condition on the computer when transmitting the electronic mail;

a step of confirming the history information containing the latest transmitted electronic mail in accordance with the transmission confirming

15   condition; and

a step of detecting an operational abnormality on the basis of a result of the confirmation.

14. An abnormality detection method on a

20   computer according to any one of Claims 10, 11 and 13, further comprising a step of informing the computer that the operational abnormality of the computer has been detected.

25   15. An abnormality detection method on a computer, by which the computer requesting a server for providing an electronic mail transmission service

to transmit an electronic mail via a network detects an operational abnormality of the computer, the method comprising:

a step of requesting the server to transmit the electronic mail;

a step of accumulating request history information about the electronic mail of which the transmission has been requested;

a step of making the server refer to the request history information; and

a step of making the server confirm the operational abnormality of the computer on the basis of the request history information.

16. An abnormality detection method on a computer according to any one of Claims 13, 15, further comprising:

a step of referring to a transmission confirming condition on the computer when transmitting the electronic mail;

a step of confirming the transmission history information containing the latest transmitted electronic mail in accordance with the transmission confirming condition; and

a step of making the computer, in case a result of the confirmation in the confirming step meets a predetermined standard, refer to the request history

information.

17. A storage medium that stored an detection
program by which a server for providing an electronic
5   mail transmission service via a network to a computer
making a request for transmitting an electronic mail
detects an operational abnormality of the computer,
the program making the server execute:
a step of referring to transmission history
10 information related to the electronic mail
transmitted based on the transmission request of the
electronic mail from the computer;
a step of referring to request history
information related to a transmission request history
15 of the electronic mail by the computer;
a step of comparing the transmission history
information with the request history information; and
a step of detecting the operational abnormality
of the computer on the basis of a result of the
20 comparison.

18. A storage medium that stored an abnormality
detection program according to Claim 17, further
comprising:
25   a step of referring to a transmission
confirming condition on the computer when
transmitting the electronic mail;

a step of confirming the transmission history information containing the latest transmitted electronic mail in accordance with the transmission confirming condition; and

5   a step of referring to, in case a result of the confirmation in the confirming step meets a predetermined standard, the request history information and comparing the request history information with the transmission history information.

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19. A storage medium that stored an abnormality detection program by which a server for providing an electronic mail transmission service via a network to a computer making a request for transmitting an

15   electronic mail detects an operational abnormality of the computer, the program making the server execute:

a step of referring to transmission history information related to the electronic mail transmitted based on the transmission request of the

20   electronic mail from the computer;

a step of referring to a transmission confirming condition on the computer when transmitting the electronic mail;

a step of confirming the transmitted

25   transmission history information containing the latest electronic mail in accordance with the transmission confirming condition; and

a step of detecting the operational abnormality of the computer on the basis of a result of the confirmation.

5   20. A storage medium that stored an abnormality detection program according to any one of Claims 17-19, further comprising:

a step of referring to the operation history information of mail software for making a request for

10   transmitting the mail on the computer;

a step of comparing the operation history information with the transmission history information; and

a step of detecting the operational abnormality

15   of the computer when a content of the transmission history information is in a predetermined relationship with a content of the operation history information.

20   21. A storage medium that stored an abnormality detection program according to any one of Claims 17-19, wherein the server is a relay device for relaying the electronic mail to a transmitting destination.

25   22. A storage medium that stored an abnormality detection program according to any one of Claims 17-19, further comprising a step of informing the

computer that the operational abnormality of the computer has been detected.

23. A storage medium that stored an abnormality detection program by which a computer requesting a server for providing an electronic mail transmission service to transmit an electronic mail via a network detects an operational abnormality of the computer, the method making the server execute:

a step of making the computer refer to the transmission history information related to the electronic mail transmitted and accumulated based on the transmission request of the electronic mail from the computer; and

a step of making the computer confirm the operational abnormality of the computer on the basis of the transmission history information.

24. A storage medium that stored an abnormality detection program executed by an electronic mail system comprising a computer for making a request for transmitting an electronic mail and a server for transmitting the electronic mail in response to the request from the computer, the program making it execute:

a step of referring to request history information related to a transmission request history

of the electronic mail by the computer;

a step of referring to transmission history information of the electronic mail by the server;

a step of comparing the request history information with the transmission history information; and

a step of detecting an operational abnormality of the computer on the basis of a result of the comparison.

25. A storage medium that stored an abnormality detection program according to Claim 23 or 24, further comprising:

a step of referring to a transmission confirming condition when transmitting the electronic mail on the computer;

a step of confirming the transmission history information containing the latest transmitted electronic mail in accordance with the transmission confirming condition; and

a step of making the computer refer to, in case a result of the confirmation in the confirming step meets a predetermined standard, the transmission history information.

26. A storage medium that stored an abnormality detection program by which a computer requesting a

server for providing an electronic mail transmission service to transmit an electronic mail via a network detects an operational abnormality of the computer, the program making the computer execute:

5 a step of referring to request history information related to the electronic mail of which the transmission request has been given to the server;

a step of referring to transmission history

10 information about a transmission history of the electronic mail accumulated on the server;

a step of comparing the request history information with the transmission history information; and

15 a step of detecting the operational abnormality of the computer on the basis of a result of the comparison.

27. A storage medium that stored an abnormality

20 detection program according to Claim 26, further comprising:

a step of referring to a transmission confirming condition on the computer when transmitting the electronic mail;

25 a step of confirming the request history information containing the latest transmitted electronic mail in accordance with the transmission

confirming condition; and

a step of referring to, in case a result of the confirmation in the confirming step meets a predetermined standard, the transmission history

5   information and comparing the transmission history information with the request history information.

28. A storage medium that stored an abnormality detection program according to Claim 26 or 27,

10   further comprising:

a step of referring to the operation history information of mail software for making a request for transmitting the mail on the computer;

a step of comparing the operation history

15   information with the transmission history information; and

a step of detecting the operational abnormality of the computer when a content of the transmission history information is in a predetermined

20   relationship with a content of the operation history information.

29. A storage medium that stored an abnormality detection program by which a computer requesting a

25   server for providing an electronic mail transmission service to transmit an electronic mail via a network detects an operational abnormality of the computer,

the program making the computer execute:

a step of accumulating history information
related to he electronic mail transmitted;

a step of referring to a transmission

5   confirming condition on the computer when
transmitting the electronic mail;

a step of confirming the history information
containing the latest transmitted electronic mail in
accordance with the transmission confirming

10   condition; and

a step of detecting the operational abnormality
of the computer on the basis of a result of the
confirmation.

15   30. A storage medium that stored an abnormality
detection program according to any one of Claims 24,
26, 29, further comprising a step of informing the
computer that the operational abnormality of the
computer has been detected.

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31.   A storage medium that stored an
abnormality detection program by which a computer
requesting a server for providing an electronic mail
transmission service to transmit an electronic mail

25   via a network detects an operational abnormality of
the computer, the method making the computer execute:

a step of accumulating request history

information related to the electronic mail of which the transmission request has been given to the server;

a step of making the server refer to the request history information; and

a step of confirming the operational abnormality of the computer on the basis of the request history information.

32. A storage medium that stored an abnormality detection program according to Claim 29 or 30, further comprising:

a step of referring to a transmission confirming condition on the computer when transmitting the electronic mail;

a step of confirming the transmission history information containing the latest transmitted electronic mail in accordance with the transmission confirming condition; and

a step of making the computer refer to, in case a result of the confirmation in the confirming step meets a predetermined standard, the request history information.

33. A server for providing an electronic mail transmission service to a computer making a request for transmitting an electronic mail, comprising:

an accepting unit accepting an electronic mail transmission request from the computer;

a transmitting unit transmitting the electronic mail of which the transmission request has been
5 accepted;

an accumulating unit accumulating transmission history information about the transmitted electronic mail;

a history referring unit referring, from on the
10 computer, to request history information about a transmission request history of the electronic mail that is accumulated on the computer;

a comparing unit comparing the transmission history information with the request history
15 information; and

a detecting unit detecting an operational abnormality of the computer on the basis of a result of the comparison.

20 34. A server according to Claim 33, further comprising:

a referring unit referring to a transmission confirming condition on the computer when transmitting the electronic mail; and
25 a confirming unit confirming the transmission history information containing the latest transmitted electronic mail in accordance with the transmission

confirming condition,

wherein in case a result of the confirmation by the confirming unit meets a predetermined standard, the history referring unit refers to the request

5 history information, and the comparing unit compares the request history information with the transmission history information.

35. A server for providing an electronic mail

10 transmission service to a computer making a request for transmitting an electronic mail, comprising:

an accepting unit accepting the electronic mail transmission request from the computer;

a transmitting unit transmitting the electronic

15 mail of which the transmission request has been accepted;

an accumulating unit accumulating transmission history information about the transmitted electronic mail;

20 a condition referring unit referring to a transmission confirming condition on the computer when transmitting the electronic mail;

a confirming unit confirming the transmission history information containing the latest transmitted

25 electronic mail in accordance with the transmission confirming condition; and

a detecting unit detecting an operational

abnormality of the computer on the basis of a result of the confirmation.

36. A server according to any one of Claims 33-35, further comprising an informing unit informing the computer that the operational abnormality of the computer has been detected.

37. A server according to any one of Claims 33 to 36, further comprising:

a unit referring to the operation history information of mail software for making a request for transmitting the mail on the computer,

wherein the comparing unit includes a unit comparing the operation history information of the mail software with the transmission history information, and

the detecting unit detects the operational abnormality of the computer when a content of the transmission history information is in a predetermined relationship with a content of the operation history information.

38. A server according to any one of Claims 33-35, wherein the server is a relay device for relaying the electronic mail to a transmitting destination.

39. A server for providing an electronic mail transmission service to a computer making a request for transmitting an electronic mail, comprising:

an accepting unit accepting the electronic mail transmission request from the computer;

a transmitting unit transmitting the electronic mail of which the transmission request has been accepted;

an accumulating unit accumulating transmission history information about the transmitted electronic mail; and

a reference instructing unit making the computer refer to the transmission history information,

wherein the computer is made to confirm the operational abnormality of the computer on the basis of the transmission history information.

40. A server according to Claim 39, further comprising:

a condition referring unit referring to a transmission confirming condition on the computer when transmitting the electronic mail; and

a confirming unit confirming the transmission history information containing the latest transmitted electronic mail in accordance with the transmission confirming condition,

wherein the reference instructing unit makes the computer refer to, in case the result of the confirmation by the confirming unit meets a predetermined standard, the transmission history

5   information.

41. A computer requesting a server for providing an electronic mail transmission service to transmit an electronic mail, comprising:

10   a requesting unit requesting the server to transmit the electronic mail;

an accumulating unit accumulating request history information about the electronic mail of which the transmission has been requested;

15   a server history referring unit referring, from on the server, to transmission history information about a transmission history of the electronic mail that is accumulated on the server;

a comparing unit comparing the request history

20   information with the transmission history information; and

a detecting unit detecting an operational abnormality on the basis of a result of the comparison.

25

42. A computer comprising:

a first referring unit referring to a request

history information about a transmission request
history of the electronic mail by the computer
requesting the server to transmit the electronic
mail;

5   a second referring unit referring the
transmission history information of the electronic
mail by the server transmitting the electronic mail
in response to the request for the electronic mail;
        a comparing unit comparing the request history
10   information with the transmission history
information; and
        a detecting unit detecting an operational
abnormality of the computer on the basis of a result
of the comparison.

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        43. A computer according to Claim 41, further
comprising
        a condition referring unit referring a
transmission confirming condition on the computer
20   when transmitting the electronic mail; and
        a confirming unit confirming the request
history information containing the latest transmitted
electronic mail in accordance with the transmission
confirming condition,
25   wherein in case a result of the confirmation by
the confirming unit meets a predetermined standard,
the history referring unit in the server refers to

the transmission history information, and the comparing unit compares the transmission history information with the request history information.

5   44. A computer according to any one of Claims 41-43, further comprising operation history referring unit referring to the operation history information of mail software for transmitting the mail on the computer,

10   wherein the comparing unit includes comparing unit comparing the request history information with the operation history information, and

the detecting unit, when a content of the history information is in a predetermined

15 relationship with a content of the operation history information, detects the operational abnormality.

45. A computer requesting a server for providing an electronic mail transmission service to

20 transmit an electronic mail, comprising:

a transmitting unit transmitting the electronic mail;

an accumulating unit accumulating history information about the transmitted electronic mail;

25   a condition unit referring to a transmission confirming condition on the computer when transmitting the electronic mail;

a confirming unit confirming the history information containing the latest transmitted electronic mail in accordance with the transmission confirming condition; and

5   a detecting unit detecting an operational abnormality on the basis of a result of the confirmation.

46. A computer according to any one of Claims

10   41-45, further comprising informing unit informing the computer that the operational abnormality of the computer has been detected.

47. A computer requesting a server for

15   providing an electronic mail transmission service to transmit an electronic mail, comprising:

a unit requesting the server to transmit the electronic mail;

an accumulating unit accumulating request

20   history information about the electronic mail of which the transmission has been requested; and

a reference instructing unit making the server refer to the request history information,

wherein the server is made to confirm the

25   operational abnormality of the computer on the basis of the request history information.

48. A computer according to Claim 47, further comprising:

a condition referring unit referring to a transmission confirming condition on the computer when transmitting the electronic mail; and

a request history confirming unit confirming the request history information containing the latest transmitted electronic mail in accordance with the transmission confirming condition,

wherein the reference instructing unit makes the server refer to, in case a result of the confirmation by the request history confirming unit meets a predetermined standard, the request history information.